

## AMENDMENTS TO THE CLAIMS

*A listing of the claims presented in this patent application appears below. This listing replaces all prior versions and listings of claims in this patent application.*

**Claim 1 to 17 (canceled).**

**Claim 18 (new):** An anisotropic conductive film comprising:

a chain comprising ferromagnetic particles directly linked to each other, the chain formed by magnetism, and

a metal layer covering the chain of ferromagnetic particles,

wherein the ratio of the length of the chain (L) to the diameter of the chain (D) is not less than 3.

**Claim 19 (new):** The anisotropic conductive film according to claim 18, characterized in that the chain of ferromagnetic particles is oriented in the thickness direction of the film.

**Claim 20 (new):** The anisotropic conductive film according to claim 18, characterized in that the ferromagnetic particles are selected from the group consisting of a metal having ferromagnetism, an alloy of two or more types of metals having ferromagnetism, an alloy of a metal having ferromagnetism and another metal, and a complex containing a metal having ferromagnetism.

**Claim 21 (new):** The anisotropic conductive film according to claim 18, wherein the chain is a straight-chain shape or a needle shape.

**Claim 22 (new):** The anisotropic conductive film according to claim 18, characterized in that the length of the chain of the ferromagnetic particles is less than the distance between

adjacent electrodes, composing a connecting portion, conductively connected by using the anisotropic conductive film.

**Claim 23 (new):** The anisotropic conductive film according to claim 22, characterized in that the diameter of the chain is not more than 1  $\mu\text{m}$ .

**Claim 24 (new):** The anisotropic conductive film according to claim 23, wherein the particle diameter of each of the ferromagnetic particles is not more than 400 nm.

**Claim 25 (new):** The anisotropic conductive film according to claim 22, characterized in that the ferromagnetic particles are selected from the group consisting of a metal having ferromagnetism, an alloy of two or more types of metals having ferromagnetism, an alloy of a metal having ferromagnetism and another metal, and a complex containing a metal having ferromagnetism and at least one metal, and the metal layer covering the chain is selected from a group consisting of Cu, Rb, Rh, Pd, Ag, Re, Pt, and Au.

**Claim 26 (new):** The anisotropic conductive film according to claim 19, characterized in that the diameter of the chain exceeds 1  $\mu\text{m}$  and is not more than 20  $\mu\text{m}$ .

**Claim 27 (new):** The anisotropic conductive film according to claim 26, characterized in that the ferromagnetic particles are selected from the group consisting of a metal having ferromagnetism, an alloy of two or more types of metals having ferromagnetism, an alloy of a metal having ferromagnetism and another metal, and a complex containing a metal having ferromagnetism and at least one metal, and the metal layer covering the chain is selected from a group consisting of Cu, Rb, Rh, Pd, Ag, Re, Pt, and Au.

**Claim 28 (new):** An anisotropic conductive film comprising:  
a chain of particles formed by magnetism, each particle comprising ferromagnetic core  
and a first metal layer covering the ferromagnetic core, and  
a second metal covering the chain of particles,  
wherein the ratio of the length of the chain (L) to the diameter of the chain (D) is not less  
than 3.

**Claim 29 (new):** The anisotropic conductive film according to claim 28, characterized in  
that the chain of particles is oriented in the thickness direction of the film.

**Claim 30 (new):** The anisotropic conductive film according to claim 28, characterized in  
that the chain of particles are selected from the group consisting of a metal having  
ferromagnetism, an alloy of two or more types of metals having ferromagnetism, an alloy of a  
metal having ferromagnetism and another metal, and a complex containing a metal having  
ferromagnetism.

**Claim 31 (new):** The anisotropic conductive film according to claim 28, wherein the  
chain is a straight-chain shape or a needle shape.

**Claim 32 (new):** The anisotropic conductive film according to claim 28, wherein the  
length of the chain of particles is less than the distance between adjacent electrodes, composing a  
connecting portion, conductively connected by using the anisotropic conductive film.

**Claim 33 (new):** The anisotropic conductive film according to claim 32, characterized in  
that the diameter of the chain is not more than 1  $\mu\text{m}$ .

**Claim 34 (new):** The anisotropic conductive film according to claim 33, wherein the  
diameter of each of the particles is not more than 400 nm.

**Claim 35 (new):** The anisotropic conductive film according to claim 32, characterized in that the particles are selected from the group consisting of a metal having ferromagnetism, an alloy of two or more types of metals having ferromagnetism, an alloy of a metal having ferromagnetism and another metal, and a complex containing a metal having ferromagnetism and at least one metal, and the second metal layer covering the chain is selected from a group consisting of Cu, Rb, Rh, Pd, Ag, Re, Pt, and Au.

**Claim 36 (new):** The anisotropic conductive film according to claim 29, characterized in that the diameter of the chain exceeds  $1\ \mu\text{m}$  and is not more than  $20\ \mu\text{m}$ .

**Claim 37 (new):** The anisotropic conductive film according to claim 36, characterized in that the particles are selected from the group consisting of a metal having ferromagnetism, an alloy of two or more types of metals having ferromagnetism, an alloy of a metal having ferromagnetism and another metal, and a complex containing a metal having ferromagnetism and at least one metal, and the second metal layer covering the chain is selected from a group consisting of Cu, Rb, Rh, Pd, Ag, Re, Pt, and Au.

**Claim 38 (new):** A method of producing an anisotropic conductive film comprising:  
applying a composite material in a binder to a base to form a film, said composite material comprising a chain of ferromagnetic particles directly linked to each other, the chain formed by magnetism, and a metal layer covering the chain of ferromagnetic particles, wherein the ratio of the length of the chain (L) to the diameter of the chain (D) is not less than 3;  
applying a magnetic field in a direction crossing a surface of the base to orient the composite material in the thickness direction of the film along the direction of the magnetic field;  
and  
curing the binding agent to fix the orientation of the composite material.

**Claim 39 (new):** The method according to claim 38, wherein the whole or a part composite material is formed by depositing in a solution containing one type or two or more types of metal ions having ferromagnetism by reducing the ions using a reducing agent in the solution.

**Claim 40 (new):** The method according to claim 39, wherein the reducing agent is a trivalent titanium compound.

**Claim 41 (new):** The method according to claim 38, wherein the ratio of the amount of the composite material to the total amount of composite material and binder is 0.05 to 20 % by volume.

**Claim 42 (new):** The method according to claim 41, wherein the ratio is 0.05 to 5 % by volume.

**Claim 43 (new):** The method according to claim 38, wherein the composite material and binder are sprayed onto the base.

**Claim 44 (new):** A method of producing an anisotropic conductive film comprising:  
applying a composite material in a binder to a base to form a film, said composite material comprising a chain of particles formed by magnetism, each particle comprising ferromagnetic core and a first metal layer covering the ferromagnetic core, and a second metal covering the chain of particles;  
applying a magnetic field in a direction crossing a surface of the base to orient the composite material in the thickness direction of the film along the direction of the magnetic field;  
and  
curing the binding agent to fix the orientation of the composite material.

**Claim 45 (new):** The method according to claim 44, wherein the whole or a part of the chain of ferromagnetic particles is formed by depositing in a solution containing one type or two or more types of metal ions having ferromagnetism by reducing the ions to a metal using a reducing agent in the solution.

**Claim 46 (new):** The method according to claim 45, wherein the reducing agent is a trivalent titanium compound.

**Claim 47 (new):** The method according to claim 44, wherein the ratio of the amount of the composite material to the total amount of composite material and binder is 0.05 to 20 % by volume.

**Claim 48 (new):** The method according to claim 47, wherein the ratio is 0.05 to 5 % by volume.

**Claim 49 (new):** The method according to claim 44, wherein the composite material and binder are sprayed onto the base.